CALFED CONSERVATION STRATEGY
SPECIES REVIEW WORKSHOP
*February 3, 1999*

# SPECIES PRESCRIPTION RECOMMENDATIONS

**Species Name:** Swainson's Hawk **Date:** 2-9-98

**Reviewer Name(s) and Affiliation:** Frank Wernette; California Dept. of Fish and Game

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**Species Goal (circle one):** R r m

| **Recommended Species Prescription:** |
|---|
| **Double the current population of breeding pairs in the Central Valley by 2020.** |
| **Justification and Documentation for Recommending the Species Prescription:** |

**The current population of Swainson's hawk breeding pairs in the Central Valley is approximately 1,000. This represents a significant reduction compared to the estimated 5,000 earlier in this century. The reduction mirrors the loss of suitable nesting habitat and foraging habitat. Doubling the current breeding population will help contribute to the recovery of this species.**

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## SPECIES PRESCRIPTION RECOMMENDATIONS

**Species Name:** Riparian Brush Rabbit **Date:** 2-9-98

**Reviewer Name(s) and Affiliation:** Frank Wernette; California Dept. of Fish and Game

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**Species Goal (circle one):** R r m

**Recommended Species Prescription:**

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|---|
| **Restore four additional self-sustaining populations of riparian brush rabbits in the Delta and on the lower San Joaquin River by 2020.** |
| **Justification and Documentation for Recommending the Species Prescription:** |
| **The current population of riparian brush rabbits is small, isolated and fragmented. It is vulnerable to extirpation under current conditions because its current habitat is susceptible to flooding with little or no nearby suitable refugia. Increasing the current population four fold and increasing the number of distinct populations will not only help contribute to the recovery of this species but reduce the risk of extinction.** |

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# SPECIES CONSERVATION MEASURE RECOMMENDATIONS FOR ACHIEVING SPECIES PRESCRIPTIONS

**Species Name:** Swainson's Hawk **Date:** 2-9-99

**Preparer Name and Affiliation:** Frank Wernette; California Dept. of Fish and Game

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**Applicable NCCP Habitat Types: Valley/foothill Riparian; Valley/foothill woodland and forest; Natural Seasonal; Managed Seasonal; Grassland; Upland Cropland; and Seasonally flooded agriculture**

| Recommended Additional Conservation Measure |
|---|
| 1. Restore riparian in combination with seasonal wetlands, grasslands, upland croplands, and seasonally flooded agriculture concurrent with any actions taken to convert lands to tidal emergent wetlands or tidal perennial aquatic habitat.<br><br>2. Ensure that at least 10 miles and 2,000 acres of Valley/foothill Riparian and Valley/foothill woodland are restored during Stage 1 in the Delta.<br><br>3. Ensure that at least 2 acres of grasslands, upland croplands, and seasonally flooded agriculture managed to provide suitable forage conditions seasonally are restored for each acre of suitable foraging habitat impacted by any CALFED program within 10 miles of a known nest site. |
| **Rationale and Documentation** |
| Restoring other wetland habitats in the Delta, such as tidal emergent wetland and tidal perennial aquatic habitat, can reduce habitat values for species such as the Swainson's hawk and the greater sandhill crane. Managing significant areas of seasonal wetlands and agricultural lands in the Delta in a wildlife friendly manner will help offset some of the effects of ERP actions which will convert other agricultural lands in the Delta to tidal wetlands thus reducing their value to species such as the Swainson's hawk. This same approach will help offset impacts associated with the Levee Program as well. |

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# SPECIES CONSERVATION MEASURE RECOMMENDATIONS FOR ACHIEVING SPECIES PRESCRIPTIONS

**Species Name:** Greater Sandhill Crane; Long-billed Curlew; Northern Harrier; Short-eared owl; tricolored black bird; Western burrowing owl **Date: 2-9-99**

**Preparer Name and Affiliation:** Frank Wernette; California Dept. of Fish and Game

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**Applicable NCCP Habitat Types: Natural Seasonal; Managed Seasonal; Grassland; Upland Cropland; and Seasonally flooded agriculture**

| Recommended Additional Conservation Measures |
|---|
| 1. Restore seasonal wetlands, grasslands, upland croplands, and seasonally flooded agriculture concurrent with any actions taken to convert lands to tidal emergent wetlands or tidal perennial aquatic habitat.<br><br>2. Ensure that at least 1 to 2 acres of grasslands, upland croplands, and seasonally flooded agriculture managed to provide suitable forage conditions seasonally are restored for each acre of suitable foraging habitat impacted |
| **Rationale and Documentation** |
| Restoring other wetland habitats in the Delta, such as tidal emergent wetland and tidal perennial aquatic habitat, can reduce habitat values for the above listed species. Increasing seasonal wetlands in the Delta will ensure that any adverse impacts associated with those habitat losses will be fully mitigated. Managing significant areas of agricultural lands in the Delta in a wildlife friendly manner will help offset some of the effects of ERP actions which will convert other agricultural lands in the Delta to tidal wetlands thus reducing their value to species such as the Swainson's hawk. |

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# SPECIES CONSERVATION MEASURE RECOMMENDATIONS FOR ACHIEVING SPECIES PRESCRIPTIONS

**Species Name:** Yellow-billed Cuckoo; Calif. Yellow Warbler **Date:** 2-9-99

**Preparer Name and Affiliation:** Frank Wernette; California Dept. of Fish and Game

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**Applicable NCCP Habitat Types:** Valley/foothill Riparian

| Recommended Additional Conservation Measures |
|---|
| 1. Restore riparian concurrent with any actions taken to convert lands to tidal emergent wetlands or tidal perennial aquatic habitat; replace impacted riparian at the rate of 3 to 5 acres for each acre of riparian impacted.<br><br>2. Ensure that at least 10 miles and 2,000 acres of Valley/foothill Riparian and Valley/foothill woodland are restored during Stage 1 in the Delta. Riparian should be restored in blocks at least 200 meters in width<br><br>3. Ensure that large contiguous blocks of willow-cottonwood riparian at least 200 meters in width and 500 acres in size are restored on the Sacramento River. |
| **Rationale and Documentation** |
| Restoring large blocks of riparian will help ensure that neotropical migrants such as the yellow-billed cuckoo will find the riparian suitable. Broad bands of riparian will help guard against introduced nest predators and competitors that can interfere with successful nesting at the edges of riparian areas.. Restoring significant areas of riparian in addition to those called for in the ERPP will contribute to the recovery of these species. |

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# SPECIES CONSERVATION MEASURE RECOMMENDATIONS FOR ACHIEVING SPECIES PRESCRIPTIONS

**Species Name:** Delta smelt; Central Valley fall-run, spring-run and winter-run chinook salmon; splittail; longfin smelt **Date:** 2-9-99

**Preparer Name and Affiliation:** Frank Wernette; California Dept. of Fish and Game

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**Applicable NCCP Habitat Types:** Tidal perennial aquatic habitat

| Recommended Additional Conservation Measures |
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| 1. Modify Delta inflow patterns and export operations during the February through June period to more closely mimic hydraulic conditions that would have occurred under conditions in the mid-1960s.<br><br>2. Modify Delta inflow patterns and export operations during the November through January period to maintain a positive QWEST value.<br><br>3. Fifty percent of any new water yield resulting from modified operating criteria or methods for Delta export facilities, new surface or groundwater storage, or water conservation and water use efficiency measures will be provided to an Environmental Water Account to be used at the discretion of the fish and wildlife agencies.<br><br>4. Funding at the rate of $1 per acre-foot of any in-Delta diversions will be provided to the fish and wildlife agencies to fund efforts to protect and improve habitat for the above species.<br><br>5. Any in-Delta barriers will be operated with criteria approved by the DFG. No Grant Line barrier will be constructed. |
| **Rationale and Documentation** |

Bay-Delta hydraulics, which refers to the direction and velocity of flows in Bay-Delta channels on a temporal, tidal, and seasonal basis for a given hydrologic condition, help define the extent to which the Bay-Delta can support important ecological functions such as sustaining a productive food web, providing spawning, rearing, and feeding habitat for estuarine and anadromous fish, and supporting migration of adult and juvenile fish. Restoration of these functions and processes are critical to the success of efforts to recover the species listed above and to restore to abundance most, if not all, of the native species and habitats in the Sacramento-San Joaquin estuary.

Human activities such as reduced Delta inflow, exports from the Delta, and conversion of tidal wetlands have had a large influence on the natural hydraulic regime of the Bay-Delta. There are opportunities to restore or simulate, where and when appropriate, a more natural hydraulic regime that sustains ecological functions and meets the life requirements of the fish and wildlife in or dependent on the Bay-Delta.

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